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May 2, 1996

HAND DELIVERY

Mr. William F. Caton
Acting Secretary
Federal Communications Commission
1919 M Street, NW
Washington, DC 20554

Re: CC Docket No. 92-297
LMDS -- GSO/FSS Sharing Rules

Dear Mr. Caton:

Texas Instruments, Inc. ("Texas Instruments") has reviewed Lockheed Martin's proposed "Potential LMDS Sharing Principles," dated April 29, 1996. In the present letter, Texas Instruments offers its comments on the Lockheed Martin proposal.

In general, Texas Instruments welcomes Lockheed Martin's suggestion that the FCC specify rules for sharing the 29.240-29.375 GHz band between LMDS and GSO/FSS gateways under Option 4 Prime. Sharing rules such as these are absolutely necessary to ensure a successful LMDS. If appropriate rules are not adopted, Texas Instruments believes that LMDS interactivity (for data, Internet connection, telephony, and VOD) will be hindered or precluded entirely. Of course, if this occurred, LMDS auction revenues would suffer greatly.

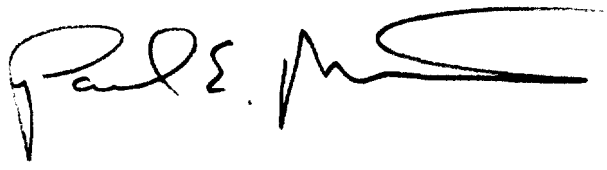
Texas Instruments generally could accept Lockheed Martin's four specific sharing principles with the following modifications, which are necessary to ensure a viable LMDS. First, in Lockheed Martin's principle No. 1, Texas Instruments believes that auction winners should be given six months after their license is granted to specify a build-out plan to the FCC. A binding commitment, as Lockheed Martin suggests, would be acceptable, but such a commitment can only be made after licensees have had a reasonable opportunity to survey their potential service areas. Given the planned timing for implementing the proposed GSO/FSS systems, the six month surveying period should not adversely affect satellite operators.

Second, in principle No. 2, Texas Instruments believes that interference into LMDS systems from the aggregate of GSO/FSS gateways beyond 16 km outside of LMDS service areas must be taken into account. Texas Instruments proposes that the aggregate power flux density from all GSO/FSS gateways operating more than 16km beyond the boundary of an LMDS service area must not be greater than -98 dBW/m^2/MHz at the boundary. This solution to the aggregate interferer problem also would address the potential problem of mainbeam/sidelobe emissions from individual gateways into nearby LMDS service areas.

Likewise, in sharing principle No. 3, Texas Instruments proposes that the Commission specify an *aggregate* PFD limit, but only incident on individual hubs identified in an LMDS operator's build-out plan. This rule would allow GSO/FSS operators to plan their gateway installations with certainty, yet would prevent these operators from rushing to install gateways within designated LMDS service areas before LMDS hubs are constructed. This rule also would protect LMDS hubs from interference accumulated from more than one GSO/FSS gateway. As with the PFD limit specified for service area boundaries, Texas Instruments believes that the aggregate interference incident on any single hub should not exceed -98dBW/m^2/MHz.

Finally, in the fourth sharing principle, Texas Instruments believes that Lockheed Martin intended to specify the antenna pattern attached to this letter. For clarity, Texas Instruments believes LMDS operators simply should be required to achieve the sidelobe performance of the mask shown in the attached chart.

Sincerely yours,



Paul E. Misener
Counsel for Texas Instruments, Inc.

Attachment

cc Mr. Richard Barnett (Lockheed Martin)
Ms. Michele Farquhar (FCC/WTB)
Mr. Robert James (FCC/WTB)
Mr. Thomas Tycz (FCC/IB)
Mr. David Wye (FCC/WTB)

LMDS SUBSCRIBER TRANSCEIVERS
29.1-29.25 GHZ BAND

ANTENNA EIRP/MASK